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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/113,094	07/10/1998	KIA SILVERBROOK	IR14US	7673

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EXAMINER	
YE, LIN	
ART UNIT	PAPER NUMBER
2615	

DATE MAILED: 06/13/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

AIR MAIL

Office Action Summary	Application No.	Applicant(s)	
	09/113,094	SILVERBROOK, KIA	
	Examiner	Art Unit	
	Lin Ye	2615	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *11 April 2005*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-4* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-4* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *25 July 2002* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☒ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

1. A request for continued examination under 37 CFR 1.114 filed on 4/11/05, including the fee set forth in 37 CFR 1. 17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1. 17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1 . 1 14. Applicant's submission filed on 2/27/05 has been entered. Applicant's arguments have been considered but are moot in view of the new ground rejection.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claims 1 and 3-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over McIntyre et al. U.S. Patent 5,894,326 in view of Kojima U.S. Patent 5,233,414 and Cane et al. U.S. Patent 5,999,203.

Referring to claim 1, the McIntyre reference disclose in Figures 1-2, an hand held electronic camera system including an optical printer (30) being adapted to be optically coupled to the display when in its print position for producing a hard copy output of the

subject represented by the display; said camera system including: an image sensor device (CCD 20, see Col. 2, lines 51-55) for sensing an image; a processing means (central processing unit 32a) for processing said sensed image; and a printing system (30) including a print head (240a and 240b, see Col. 5, lines 18-25) for printing out said sensed color image; wherein the method of color correction (color balance correction is inherent for per-channel color correction, the applicant states "per-channel color correction is what is intended by "color correction") said sensed image before printing comprises (See Col. 4, lines 62-64); receiving input from a user indicating that the image is to be sensed (e.g., user pushes shutter button for capturing image); in response to the input, utilizing said image sensor device to sense a first image a first scene (e.g., to create an image of correct density and color balance on the media 224, see Col. 4, lines 63-67); sense a second image in rapid succession to the first image (e.g., digital camera can rapidly sense a plurality of images of the scene inherently) and printing out said second image by said print head (e.g., the user determines which image to be printed, see Col. 4, lines 55-59). However, the McIntyre reference does not explicitly disclose determining the color characteristics of first image, utilizing the imaging sensor without further user input to sense a second image of said same first scene, applying per-channel color correction to second image based on the determined color characteristics of said first image.

The Kojima reference teaches a color image processing apparatus processing the first image (prescan image) to determine color characteristics of said first image (e.g., color balance correction parameters of the prescan image, see Col. 7, lines 5-10); utilizing the image sensor (CCD 17-19) device without further user input (without waiting for the key

input) to sense a second image (main scan image) of said same first scene, in rapid succession to said first image, wherein content of said second image is substantially identical to said first image; applying per-channel color correction (per-channel color balance correction) to said second image based on the determined color characteristics of said first image (See Col. 7, lines 13-22). The Kojima reference is evidenced that one of ordinary skill in the art at the time of the invention to see more advantages for the image processing system applying a color correction on the second image based on the color characteristics of the firs image so that the system can automatically (e.g., without further user input) output a plurality color image with consistent color characteristics (See Col. 1, lines 23-40). For that reason, it would have been obvious one having ordinary skill in the art at the time of the invention was made to modify the camera printer system of McIntyre by providing a color correction method for determining the color characteristics of first image, utilizing the imaging sensor without further user input to sense a second image of said same first scene, and applying per-channel color correction to second image based on the determined color characteristics of said first image as taught by Kojima.

The McIntyre reference does not explicitly show the printing system include other type of printer such as ink-jet printer instead of only optical printer.

The Cane reference teaches in Figures 1, 6 and 10-13, a hand held camera system (as shown in Figures 10-13) including an image sensor device (CCD, see Col. 4, lines 13-22) for sensing an image; and a printing assembly for providing instant images. Alternatively, the printing assembly can be a dot matrix printer, an ink-jet printer or other appropriate type of printer (See Col. 7, lines 48-55). The Cane reference is evidenced that one of ordinary skill

in the art at the time of the invention to see more advantages for the hand held camera system has more flexible options to including any appropriate type of printer such as ink-jet printer for printing out instant images. For that reason, it would have been obvious one having ordinary skill in the art at the time of the invention was made to modify the camera printer system of McIntyre by providing an inkjet printer or other appropriate type of printer as taught by Cane.

Referring to claim 3, the Kojima reference discloses that examining the intensity characteristics (exposure level) of the first image (pre scan image, see Col. 7, lines 6-10).

Referring to claim 4, the Kojima reference discloses wherein said processing step determines a maximum and minimum intensity of first image (pre scan image) and utilizes intensities to rescale the intensities of said second image (main scan image) (e.g., determining the correction parameter for correcting the second image based on the color characteristics of the first image, the magnitude of correction parameter has a predetermined range – as the difference of maximum and minimum intensity of first image, see Col. 9, lines 25-35 and Col. 9, lines 55-62).

4. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over McIntyre et al. U.S. Patent 5,894,326 in view of Kojima U.S. Patent 5,233,414 and Miyagawa et al. U.S. Patent 6,281,533.

Referring to claim 2, the McIntyre and Kojima references disclose all subject matter as discussed in respected claim 1, except the references do not explicitly state that exact time for the image sensor to sense a second image from first image.

The Miyagawa et al. reference discloses in Col. 19, lines 61-65, clearly states a high performance compact still digital camera system (Figure 25) that can take a number of pictures successively **within a second**. This means the second image is sensed within 1 second of first image. In col. 19, lines 56-58 sets forth the motivation to keep the image readout rate short within 1 second in the digital camera art for reducing power consumption level and a low voltage level and produce high quality pictures with a good S/N ratio. For that reason, it would have been obvious to one having ordinary skill in the art at the time of the invention was made to see McIntyre's camera system has this kind of ability.

Conclusion

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lin Ye whose telephone number is (571) 272-7372. The examiner can normally be reached on Mon-Fri 8:00AM-5:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David L. Ometz can be reached on (571) 272-7593. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Lin Ye
Examiner
Art Unit 2615

June 8, 2005